Amendment to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (currently amended) An information processing system comprising

a storage equipment which includes a logical unit logically assigned to physical devices and

an information processing apparatus which sends data input/output requests to said storage equipment,

wherein

the data input/output requests are transferred through logical paths serving as communication paths to said logical unit,

wherein

a cache memory is provided to prefetch and store both data in a location to be accessed by one of said data input/output requests and data in locations following said location within said physical devices,

said information processing apparatus comprising

a path selection management section which manages configurations of a plurality of blocks into which said logical unit is divided,

an I/O request allocation section which allocates data input/output requests to be transmitted to said storage equipment to said logical paths, and

I/O processing units which transmit said data input/output requests through said logical paths, according to the allocation determined by said I/O request allocation section, pursuant to an established protocol,

wherein

said path selection management section assigns at least one of said logical paths to one of said ~~blocks~~ blocks, and

said I/O request allocation section allocates data input/output requests that specify consecutive locations on the logical unit to the same logical path assigned by said path selection management section when data input/output requests that specify consecutive locations on the logical unit are received.

2. (currently amended) The information processing system according to claim 1, wherein said I/O request allocation section includes

a section to detect a path fault which detects a faulty path among said logical paths and

a section to detect path recovery which detects recovery of the faulty path among said logical paths, wherein

when a faulty path is detected by said section to detect a path fault or when the faulty path recovery is detected by said section to detect path recovery, said path selection management section reconfigures said blocks by altering at least one of size of said blocks ~~and/or~~ or the number of paths assigned to said blocks.

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3. (original) The information processing system according to claim 1, wherein said cache memory is included in a disk control unit within said storage equipment.

4. (original) The information processing system according to claim 1, wherein said I/O processing units are provided with said cache memory.

5. (original) The information processing system according to claim 1, wherein said path selection management section includes

a path management section which creates a path management table containing information about said logical paths that are recognizable at the start of said information processing apparatus,

a blocks setup management section which creates an LU management table containing information about said logical units, referring to said path management table, and

a block management section which creates a block management table containing information about said blocks, referring to said LU management table, wherein

said path selection management section divides said logical unit into a plurality of blocks and assigns said logical paths to said blocks, referring to said block management table.

6. (currently amended) An information processing apparatus which sends data input/output requests to a storage equipment which includes a logical unit logically assigned to physical devices through logical paths serving as communication paths to said logical unit, said information processing apparatus comprising

a path selection management section which manages configurations of a plurality of blocks into which said logical unit is divided,

an I/O request allocation section which allocates data input/output requests to be transmitted to said storage equipment to said logical paths, wherein

I/O processing units which transmit said data input/output requests through said logical paths, according to the allocation determined by said I/O request allocation section, pursuant to an established protocol, wherein said path selection management section assigns at least one of said logical paths to one of said ~~blocks~~ blocks, and

_____said I/O request allocation section allocates data input/output requests that specify consecutive locations on the logical unit to the same logical path assigned by said path selection management section when data input/output requests that specify consecutive locations on the logical unit are received.

7. (original) The information processing apparatus according to claim 6, wherein said storage equipment or said information processing apparatus is

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provided with a cache memory which prefetches and stores both data in a location to be accessed by one of said data input/output requests and data in locations following said location within said physical devices.

8. (currently amended) The information processing apparatus according to claim 6, said I/O request allocation section includes

a section to detect ~~path~~ a path fault which detects a faulty path among said logical paths and

a section to detect path recovery which detects recovery of the faulty path among said logical paths, wherein

when a faulty path is detected by said section to detect ~~path~~ a path fault or when the faulty path recovery is detected by said section to detect path recovery, said path selection management section reconfigures said blocks by altering one of size of said blocks ~~and/or~~ or the number of paths assigned to said blocks.

9. (original) The information processing apparatus according to claim 6, wherein said I/O processing units are provided with said cache memory.

10. (original) The information processing apparatus according to claim 6, wherein said path selection management section includes

a path management section which creates a path management table containing information about said logical paths that are recognizable at the start of said information processing apparatus,

a blocks setup management section which creates an LU management table containing information about said logical units, referring to said path management table, and

a block management section which creates a block management table containing information about said blocks, referring to said LU management table,

wherein

said path selection management section divides said logical unit into a plurality of blocks and assigns said logical paths to said blocks, referring to said block management table.

11. (withdrawn-currently amended) A method for controlling an information processing apparatus which sends data input/output requests to a storage equipment which includes a logical unit logically assigned to physical devices through logical paths serving as communication paths to said logical unit, in which method setting up is performed for configurations of a plurality of blocks into which said logical unit is divided, said method comprising

creating a path management table, based on information about said logical paths that are recognizable at the start of said information processing apparatus,

creating an LU management table containing information about said logical

units by reference to said path management table,

creating a block management table containing information about said blocks

by reference to said LU management table,

dividing said logical unit into a plurality of blocks by reference to said block

management ~~table, and~~ table,

assigning at least one of said logical paths to one of said ~~blocks~~ blocks, and

allocating data input/output requests that specify consecutive locations on the

logical unit to the same logical path assigned in said assigning step when data

input/output requests that specify consecutive locations on the logical unit are

received.

12. (withdrawn-currently amended) The control method according to claim

11, further comprising

reconfiguring said blocks by altering one of size of said blocks ~~and/or~~ or the

number of paths assigned to said blocks when a faulty path is detected among said

logical paths or when recovery of the faulty path among said logical paths is

detected.

13. (withdrawn) A method for controlling an information processing apparatus

which sends data input/output requests to a storage equipment which includes a

logical unit logically assigned to physical devices and divided into a plurality of blocks

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through logical paths serving as communication paths to said logical unit, said

method comprising

selecting, based on one of said data input/output requests, an I/O

processing unit assigned to a block where data to be accessed by the data

input/output request exists and making the selected I/O processing unit process the

data input/output request.

14. (withdrawn) A method for controlling an information processing apparatus

which sends data input/output requests to a storage equipment which includes a

logical unit logically assigned to physical devices and divided into a plurality of blocks

through logical paths serving as communication paths to said logical unit, said

method comprising

determining whether data to be accessed by one of said data

input/output requests is stored on a cache memory, if the data to be accessed by the

data input/output request is stored on said cache memory,

selecting an I/O processing unit that processed the last data

input/output request and making said cache memory work, if the data to be accessed

by the data input/output request is not stored on said cache memory,

selecting an I/O processing unit assigned to a block where the data to

be accessed by the data input/output request exists and making the selected I/O

processing unit process the data input/output request.

15. (withdrawn-currently amended) A computer program to implement functions of an information processing apparatus which sends data input/output requests to a storage equipment which includes a logical unit logically assigned to physical devices through logical paths serving as communication paths to said logical unit, said computer program comprising

computer program code means for creating a path management table, based on information about said logical paths that are recognizable at the start of said information processing apparatus,

computer program code means for creating an LU management table containing information about said logical units by reference to said path management table,

computer program code means for creating a block management table containing information about said blocks by reference to said LU management table,

computer program code means for dividing said logical unit into a plurality of blocks by reference to said block management ~~table, and~~ table,

computer program code means for assigning at least one of said logical paths to one of said ~~blocks~~ blocks, and

computer program code means for allocating data input/output requests that specify consecutive locations on the logical unit to the same logical path assigned to said one of said blocks when data input/output requests that specify consecutive locations on the logical unit are received.

16. (withdrawn-currently amended) The computer program according to claim 15, further comprising

computer program code means for reconfiguring said blocks by altering one of size of said blocks and/or or the number of paths assigned to said blocks when a faulty path is detected among said logical paths or when recovery of the faulty path among said logical paths is detected.

17. (currently amended) A computer program to implement functions of an information processing apparatus which sends data input/output requests to a storage equipment which includes a logical unit logically assigned to physical devices through logical paths serving as communication paths to said logical unit, said computer program comprising

computer program code means for managing configurations of a plurality of blocks into which said logical unit is divided,

computer program code means for allocating the data input/output requests to be transmitted to said storage equipment to said logical paths,

computer program code means for transmitting said data input/output requests through said logical paths, according to the allocation determined by said allocation means, pursuant to an established protocol, and protocol,

computer program code means for assigning at least one of said logical paths to one of said blocks. blocks, and

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computer program code means for allocating data input/output requests that specify consecutive locations on the logical unit to the same logical path assigned to said one of said blocks when data input/output requests that specify consecutive locations on the logical unit are received.

18. (new) The information processing system according to claim 1, wherein said I/O request allocation section:

appoints one of said I/O processing units to transmit a data input/output request through the same logical path that was used to transmit the previous data input/output request when said data input/output request sent from said information processing apparatus is sequential to the previous data input/output request; and

appoints one of said I/O processing units to transmit said data input/output request through a path assigned to said block when said data input/output request sent from said information processing apparatus is a random access request.

19. (new) The information processing apparatus according to claim 6, wherein said I/O request allocation section:

appoints one of said I/O processing units to transmit a data input/output request through the same logical path that was used to transmit the previous data input/output request when said data input/output request sent from said information processing apparatus is sequential to the previous data input/output request; and

appoints one of said I/O processing units to transmit said data input/output request through a path assigned to said block when said data input/output request sent from said information processing apparatus is a random access request.

20. (new) The method according to claim 11, further comprising:

transmitting a data input/output request through the same logical path that was used to transmit the previous data input/output request when said data input/output request sent from said information processing apparatus is sequential to the previous data input/output request; and

transmitting a data input/output request through a path assigned to said block when said data input/output request sent from said information processing apparatus is a random access request.

21. (new) The computer program according to claim 15, further comprising:

computer program code means for causing transmission of a data input/output request through the same logical path that was used to transmit the previous data input/output request when said data input/output request sent from said information processing apparatus is sequential to the previous data input/output request; and

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computer program code means causing transmission of a data input/output request through a path assigned to said block when said data input/output request sent from said information processing apparatus is a random access request.